

IMPLEMENTATION TEAM MEETING NOTES

April 3, 2003, 9:00 a.m.-3 p.m.

**NOAA FISHERIES OFFICE
PORTLAND, OREGON**

I. Greetings, Introductions and Review of the Agenda.

The April 3, 2003 meeting of the Implementation Team, held at the NOAA Fisheries offices in Portland, Oregon, was chaired by Jim Ruff of NMFS and was partially facilitated by Donna Silverberg. The meeting agenda and a list of attendees are attached as Enclosures A and B.

The following is a distillation (not a verbatim transcript) of items discussed at the meeting, together with actions taken on those items. Please note that some enclosures referenced in the body of the text may be too lengthy to attach; all enclosures referenced are available upon request from NMFS's Kathy Ceballos at 503/230-5420 or via email at kathy.ceballos@noaa.gov.

Silverberg welcomed everyone to the meeting, led a round of introductions and a review of the agenda.

2. Updates.

A. In-Season Management (TMT). Silverberg said that, at yesterday's TMT meeting, the question of whether and when to begin the BiOp spill program at the three Lower Snake collector dams received extensive discussion, but was not resolved. Cindy Henriksen, TMT chair, distributed Enclosure C, an issue statement regarding the start of the Lower Snake River spill season. The issue was articulated as follows:

- Is 85 Kcfs projected seasonal average flow at Lower Granite the threshold to initiate spill at the three Lower Snake collector projects?
- If the answer to this question is no, then the TMT requests guidance as to the criteria that should be used to determine the duration and timing of spill at these projects.

There was a brief discussion of whom, precisely, framed and elevated this issue to the IT; Boyce said that, in his opinion, the action agencies raised this issue in response to SOR 2003-5. Henriksen noted that, in addition to the issue statement, Enclosure C includes a copy of SOR 2003-5 and a variety of supporting analytical information.

A lengthy discussion ensued, touching on the validity of the Corps' computer modeling of expected April-June flows, results from the most recent STP run (showing 17.2 MAF April-July runoff and 82 Kcfs seasonal average flow at Lower Granite) and the River Forecast Center water supply forecast model (16.9 MAF April-July runoff at Lower Granite), recent snow accumulations in Idaho and their potential to improve the Lower Granite forecast (both the Salmon and Clearwater basins are now over 100% of normal snow pack, noted Steve Pettit).

The group discussed the various competing interpretations of John Williams' (NOAA Fisheries Science Center) recent in-river vs. transport survival study presentation to TMT; historic flow and spill data for Lower Granite during the first two weeks in April; the fact that projected spring seasonal average flow at Lower Granite is now right on the cusp of 85 Kcfs; the fact that the 2003 outmigration from the Snake is expected to be one of the largest and most important on record, particularly for wild spring/summer chinook and steelhead, and that large numbers of juveniles are already moving throughout the Snake River basin.

Henriksen noted that, ultimately, the TMT had been unable to reach consensus on the implementation of the SOR due to ongoing questions, on the action agencies' part, about the biological benefits of spill and the interpretation of the 2000 FCRPS BiOp language regarding the trigger for initiating spill at the Lower Snake collector projects.

Boyce and Howard Schaller pointed out that trap catches to date are by far and away the largest on record; given the current temperature regime in the river, those fish are moving out far earlier than they have done in past years, despite the fact that flows are still comparatively low. Boyce added that this outmigration consists of the progeny from the record-breaking 2001 spawning recruitment year in the Snake. The group discussed the potential impacts of the spill decision on migrating juvenile steelhead; Paul Wagner noted that, based on DART's historical record, the timing of the steelhead outmigration is typically about a week later than the spring/summer chinook migration. Sharon Kiefer noted that IDFG is estimating that 1.7 million wild yearling spring/summer chinook will arrive at Lower Granite this year, more than double the average of the previous 11 years. We expect a higher-than average wild steelhead outmigration in the Snake this year as well, Kiefer added. The discussion then returned to the NOAA Fisheries' transport - inriver survival studies and what, exactly, can be concluded from this information. Wagner noted that, in NOAA Fisheries' opinion, this data strengthens the argument for a spread-the-risk approach; in addition, it shows the highest biological benefit for in-river migrants early in the season.

Ruff noted that the essence of SOR 2003-5, which is supported by all of the salmon managers (not a frequent occurrence), is that, if we're this close to the 85 Kcfs seasonal average flow called for in the BiOp, and if juvenile fish numbers and snow-packs in the basin are

increasing, then all of the salmon managers, including NOAA Fisheries, feel that there are valid reasons why this SOR should be implemented at this time, with the understanding that all fish collected will still be transported. This year's runoff is looking very close to what we saw in 2000, with a 17.2 MAF runoff at Lower Granite and an 85 Kcfs seasonal average flow, Ruff added. So what's your answer to the specific question elevated to IT? Suzanne Cooper asked. That we think the seasonal average flow at Lower Granite will be 85 Kcfs this year, Ruff replied. And what if Tuesday's April final forecast, which should be available next Tuesday, doesn't bear that out? Jim Athearn asked. Good question, said Ruff – we do have the option of waiting until the April final forecast is available next week. We could also go ahead and initiate spill now, then revisit that decision once the forecast is available next Tuesday, Schaller observed.

Discussion ensued, with the IT membership pondering various potential permutations of the spill decision. Cooper said Bonneville would prefer to wait until next Tuesday's forecast is available before making the spill decision for the Lower Snake projects. Boyce replied that the action agencies are splitting hairs about the runoff volume forecast; what is truly significant is that all of the salmon managers agree that implementing the SOR now is what is best with fish. Athearn said that RPA 40 is clear that 85 Kcfs seasonal average flow at Lower Granite is the threshold for deciding whether to initiate spill at the Lower Snake projects. Ruff replied that the RPA also states that the 85 Kcfs threshold can be revisited based on new information, such as the Science Center's recent survival analysis.

In response to a question from Silverberg, Bob Heinith said CRITFC is convinced that Lower Snake spill should be initiated as soon as possible; CRITFC supports the immediate implementation of SOR 2003-5. Sharon Kiefer said that IDFG participated in the development of and supports SOR 2003-5. ODFW supports implementation of SOR 2003-5 as well, said Boyce. WDFW also supports it, said Bill Tweit. In response to a question from Suzanne Cooper, Ruff said that, in NOAA Fisheries' opinion, in this particular year, it appears that the early-season migrants are no worse off or better inriver than the transported fish, so a spread-the-risk approach makes sense. In a year in which the outlook was drier, and the forecast was likely to decline, then our recommendation might be different, he said.

The debate then returned to the validity of the available in-river vs. transport survival data; Jim Litchfield, in particular, said he is unconvinced that the data are clear or valid enough to drive a definitive conclusion – the error bounds around this information is just too large, he said. Rebecca Kalamasz agreed that the data are not yet definitive; in such a case, she said, there are many who would argue that a spread-the-risk approach makes even more sense.

Ultimately, Silverberg suggested a caucus break. When the meeting resumed, Silverberg noted that the salmon managers' positions on this issue are already a matter of record; she then asked the federal agencies to state their positions on the spill question. Ruff said NOAA Fisheries' position is that while they acknowledge that RPA 40 calls for the action agencies to implement spill at the collector dams when the spring seasonal average flow at Lower Granite meets or exceeds 85 Kcfs, the system is very close to that threshold this year. We are also aware that a large juvenile outmigration is both expected and starting to arrive at the Lower Snake Dams. Given all of this information, as well as the recent Science Center inriver-transport data,

Ruff said, NOAA Fisheries advocates a spread-the-risk approach this spring. We will still transport every fish we collect at the Lower Snake projects, said Ruff, but we also would like to keep a substantial number of juvenile migrants in the river, particularly, given recent inriver survival data for spring/summer chinook. The indicators are that the water supply forecast will continue to improve, he said; we believe the action to start the spill program now is within the spirit and intent of the 2000 FCRPS Biop.

The Corps is willing to start the spill program now, said Athearn, but I must express our frustration with the data on which we are expected to base this decision. Also, he said, the Corps feels this is a unique water year, and we do not view the decision we make this year as precedent-setting. We feel it is reasonable to expect some flexibility in the 85 Kcfs number, he said; I don't think anyone ever anticipated a water year when we would be right at 85 Kcfs as a seasonal average flow at Lower Granite -- normally, we're either well above or well-below that flow level. Athearn requested that NOAA Fisheries provide written criteria to help guide in-season decision-making about when and if to begin spill at collector projects during marginal water years such as this one. Ruff agreed to ask Paul Wagner to develop such criteria and to provide them to the TMT. Athearn added that the Corps would like TMT to continue to revisit the spill operation as the season progresses; they should have the flexibility to turn the switch off as well as on, if the forecast starts to deteriorate later in the season, he said. NOAA Fisheries supports such in-season management flexibility, Ruff replied.

Cooper said that BPA agrees this is a unique water year, in that the seasonal average flow forecast is so close to the threshold. In light of the biological rationale discussed today -- the early migration pattern and large number of early-season fish -- BPA is willing to support starting spill now, subject to the same qualifications as the Corps, Cooper said: that TMT continues to revisit the spill operation through the season as the forecast progresses. Cooper added that BPA is anticipating persistent economic hardship, both for the agency and the region, for the foreseeable future; she asked that the salmon managers keep that in mind, because the spill program is a large cost to Bonneville.

The group devoted a few minutes of information to the question of what types of research projects NOAA Fisheries should encourage in order to resolve some of the action agencies' concerns about the available survival data; Ruff said he will pursue the development of such future research projects with the NOAA Science Center.

So spill will begin tonight, according to the specifications of SOR 2003-5? Boyce asked. Correct, Henriksen replied -- spill will begin at Lower Granite tonight, followed by spill at Little Goose on April 5, at Lower Monumental on April 7 and at Ice Harbor on April 9. In response to a question, Cooper said her understanding is that there will be a 40-day RSW test at Lower Granite this year.

B. Independent Scientific Advisory Board (ISAB). No ISAB report was presented at today's meeting.

C. Water Quality Team (WQT). Mark Schneider distributed a handout touching on

recent WQT activities, including its recommendation on the proposed Grand Coulee/Chief Joseph spill-generation swap. He provided a brief overview of this proposed operational change, which, in essence, would treat Chief Joseph and Grand Coulee dams as a composite project, balancing spill and flow at the two projects to achieve reductions in Mid-Columbia TDG levels. Schneider described the operational modifications designed in response to the following question: “Can reductions to total dissolved gas saturation be achieved in the Upper Columbia River through joint operation of Grand Coulee Dam and Chief Joseph Dam (absent spillway deflectors)?” The WQT’s proposed joint operation includes the following specific recommendations:

- Joint operation of Grand Coulee and Chief Joseph is recommended to reduce the average total dissolved gas (TDG) concentrations in the Columbia River above and below Chief Joseph by taking advantage of the larger generation flow capacity of Grand Coulee and the lower average TDG loading below Chief Joseph spillways (even absent deflectors).
- When Lake Roosevelt is below elevation 1260 feet, spill from the outlet tubes should be avoided by transferring generation to Grand Coulee by shifting all spill to Chief Joseph for spill discharges up to 70 Kcfs. If river conditions require spill releases above 70 Kcfs at Chief Joseph, the additional spill should be distributed between Chief Joseph and Grand Coulee in a 2.5:1 ratio.
- When Lake Roosevelt TDG is elevated and at or above elevation 1260 feet, spill over the drum gates at Grand Coulee may be beneficial to the system due to potential degassing. The continuation of monitoring practices and additional investigations of these operational measures on TDG exchange are recommended to further establish the most efficient and effective joint operations of Chief Joseph and Grand Coulee Dams.
- Study results predict that joint operations will decrease the average TDG saturation in the Columbia River below Chief Joseph and Grand Coulee dams, but increase the localized TDG saturation in an area below the Chief Joseph spillway. If joint operation is pursued, coordination with WDOE will be required to approve the localized TDG saturation increase below the Chief Joseph spillway.

Schneider added that Congress did include a separate new-start appropriation to allow design of Chief Joseph flow deflectors in FY’03, the only such new start in the country. That was a tremendous achievement for our Congressional delegations, Ruff observed; however, an even greater challenge awaits: finding construction funds for this project, expected to be on the order of \$8 million in FY’04 and \$16 million in FY’05.

This operational recommendation represents a substantial amount of work for a WQT subgroup, said Ruff; has this proposed operational swap been approved by both the WQT and TMT, and is it being presented to us as an information item? Correct, Schneider replied – it will be implemented through the spill priority list being developed for this spring.

D. System Configuration Team (SCT). Bill Hevlin reported that the SCT has been focusing most of its effort on the FY’03 funding situation; he noted that the government typically withholds about 16% of the appropriation for “savings and slippage.” Those funds are usually made available a few month’s later, Hevlin said; this year, however, the Corps is being

told not to expect those funds – about \$15 million out of the \$85 million appropriated – to be restored.

At its March 20 meeting, said Hevlin, the SCT went through the FY'03 CRFM program line by line and identified some potential areas that could be cut -- mainly research projects that can be deferred -- if we suddenly found ourselves with a \$70 million rather than an \$80 million program. The McNary fall chinook delayed mortality study and the John Day summer spill survival studies both were considered for deferral, Hevlin said; the consensus was that both studies should be funded if possible, but that the John Day study was the more important of the two. After the March 20 meeting, the Corps was able to find the funds to do the John Day study; the McNary fall chinook delayed mortality study will be deferred until FY'04, said Hevlin. No issues were elevated to the IT at that March 20 meeting, he added; our hope is that we're not going to have to go through this again next year.

E. TMDL Update. No TMDL update was presented at today's meeting.

F. Water Quality Plan Work Group. Ruff said the work on the TDG and temperature sections of the Mainstem Water Quality Plan are progressing; he noted that there is currently an opportunity to comment on those sections. As soon as we have a draft of the mainstem water quality plan we feel we can share with the IT, Ruff said, we will do so.

Ruff added that the Federal Caucus had numerous discussions about the need for and value of facilitation and notetaking services for the Regional Forum meetings, because the Power Planning Council had zeroed out funding for the facilitation contract in February. Thanks primarily to the Corps, the Bureau of Reclamation, and BPA, some funding was restored to both contracts; Donna Silverberg and her team will be focusing most of their efforts on the TMT. BPA is paying for the notetaking services, while the Corps and Reclamation are cost-sharing the facilitation services. Palensky added that both contracts have been extended only through the end of the present fiscal year, so the IT will need to have some further discussions about what will happen in FY'04.

3. Update on NOAA Fisheries' 2003 Findings Report.

Chris Toole reported that the 2003 findings letter is not yet finished; Toole provided a brief overview of the history of this task, including the impact of the BPA reprioritization process on the Implementation Plan and the findings letter. The earliest we're going to be able to finalize the Findings Report is late next week, Toole said, adding that the week after that is more likely. There are still a number of issues under discussion between NOAA Fisheries and the action agencies, Toole said, including the status of the following delayed RPAs:

- RPA 31, Banks Lake NEPA
- RPA 36, Libby Dam forecasting methods and flood control studies
- RPA 136, construction of flow deflectors at Chief Joseph Dam
- RPA 154, development of subbasin assessments and subbasin plans
- RPA 174, comprehensive marking plan for hatchery fish

- RPA 183, effectiveness monitoring
- RPA 198, development of the regional database system

There are good reasons why all of these have been delayed, said Toole; the primary discussion, right now, centers around the question of how much delay becomes a reason for concern. That discussion is ongoing, and our hope is that the questions surrounding these RPAs will be resolved within a week or two, so that the findings letter can be finalized and released.

4. Summary of NWPPC's Adopted Mainstem Fish and Wildlife Program.

Because the Council did not adopt the mainstem amendment at its March 28 meeting, this agenda item was deferred.

5. Update on Federal Caucus Activities.

Jim Fodrea said the Federal Caucus has been adding some administrative personnel recently; Lisa Croft as the Federal Caucus Coordinator and David Devine as the Federal Caucus support person. At yesterday's Caucus meeting, said Fodrea, they discussed Idaho Senator Crapo's April 23 hearing in Boise about progress toward implementing the Biological Opinion, and the action agency testimony at that hearing; we also discussed the NRCS' addition to the Caucus and our interactions with CEQ, including the Corps' savings and slippage budget issue and NOAA Fisheries' RM&E finding problems. Much of yesterday's meeting agenda was taken up with a discussion of subbasin planning, Fodrea said. At Heinith's request, Fodrea spent a few minutes going through the various plans and reports the Federal Caucus will be producing, together with the timeline for their development.

6. PSU Leadership Institute: Lessons Learned From the 2001 Emergency Season.

Silverberg introduced PSU's Craig Shinn and Ward Armstrong, the organizers of a week-long seminar for the PSU Executive Leadership Institute on the lessons learned during the 2001 power system emergency.

Armstrong began by describing the Executive Leadership Institute, originally founded at Lewis & Clark, explaining that it focuses primarily on case studies of highly controversial natural resource public policy issues. In two weeks, for instance, we'll be going up to Neah Bay to study the Makah tribal whale fishery, Armstrong said. Class size is in the 16-20 student range; most participants are drawn from public agencies.

Shinn described his own background, then went through the Executive Seminar process in some detail. He and Armstrong then went through a series of issues or "impulses" identified at the energy crisis seminar, together with their summaries of the consensus the group reached on each of these issues:

- **What is the nature of a crisis?** By definition, crises are difficult or impossible to anticipate. One lesson learned, according to the seminar participants: more advance

planning and brainstorming could be done to anticipate potential crisis scenarios, and to develop a clear understanding of the responsibilities of the various partners in alleviating that crisis. Also, we found you cannot communicate too early or too often.

- **Tinkering with energy markets can have huge and unexpected consequences.** Obviously deregulation played a key role in the runup to the 2001 energy crisis; the West Coast energy market is imperfect. Wherever imperfect markets exist, there is a role for government. The effects of deregulation need to be rethought.
- **Understanding the interconnectivity of the institutional relationships in the region is a must.**
- **Markets that are robust are markets that are complex.** Designing in that kind of complexity is something to consider if you want that market to work.
- **When you make adjustments in large institutional structures, you need to plan for those adjustments so that the people who are negatively affected by those changes are treated responsibly.**
- **Organizations need to be able to handle complex situations with ambiguity and with uncertainty.** Who are the critical actors who are making the situation so ambiguous and uncertain? What motivates or constrains their behavior? Where is the leadership going to come from? Where will the leaders for tomorrow's crisis come from?
- **Rethink BPA's role in the region.** The '01 crisis reminded us of the size and range of the effects BPA can create with its actions; it can set the table for the region. If that is desirable, there need to be some changes to BPA's function. If it is not desirable, then some discussion of alternative governance structures needs to take place.
- **Politics rule the Columbia Basin.**
- **Policy choices are based on values.**
- **It is vital to build relationships before crises occur.** The time to build a foundation of trust is before relationships become strained by crisis.

What will you do with the information developed through your seminars? Denny Rohr asked. Because we want to encourage complete candor and the free exchange of ideas, we don't keep a case brief or formal notes from these seminars, Shinn replied; in my view, the most important future usefulness of these seminars is the network of contacts that is created among the participants. We also staff these seminars with graduate students, who, in some cases, get so excited about one of the issues they go back and create a record of the content of a given seminar as part of their theses, Shinn said.

One observation, said Schaller – what happened in 2001 was a sort of perfect storm; we had one of the worst water years on record, coupled with the ill-considered deregulation of the California power market, compounded by criminal wrongdoing on the part of some energy traders. To me, he said, there isn't much you can do, in terms of advance planning, to avert such a multiple crisis. That may be true, but we can do a better job of recognizing patterns, and we can be ready to act on them, Shinn replied – in the wake of 9/11, there is an entire industry built on risk management, and there are some amazing resources available in this area. Shinn added that information on future Executive Leadership Institute classes and seminars are available via the Institute's website.

7. Arrangements and Schedule for May IT Meeting.

Rohr said the arrangements for the April 30-March 1 IT meeting in Wenatchee are now complete. On April 30, there will be an IT meeting in the afternoon. The following day, there will be a morning tour of the Rocky Reach bypass system, followed by tours of Rock Island and Wells if desired. The location of the IT meeting itself is still t.b.d., but likely will take place at Chelan PUD headquarters.

8. Regional Coordination of the Five-Year Implementation Plan.

With respect to what we're doing to broaden involvement in the development of the next round of implementation plans, said Jim Fodrea, there has been a series of meetings and workshops on the 2003-2007 Implementation Plan. There was a general desire expressed by a variety of parties for more up-front participation by the non-federal parties in the 2004-2008 plan's development, rather than simply allowing an opportunity to comment once the draft plan has been developed. We're looking to incorporate those suggestions in our development of the 2004-2008 plan, which is due for completion by the end of this fiscal year, Fodrea said. Our preference would be to use existing forums, such as IT, to discuss what should be included in the 2004-2008 plan, he said. The 2003-2007 plan is something of a five-year plan template, although we have not yet begun to develop the 2004-2008 plan, said Fodrea. He added that the action agencies plan to meet with CBFWA, the Council and the Lower Columbia River Estuary Forum in addition to the Regional Forum teams.

In response to a question from Palensky, Fodrea said the action agencies would like to have a solid draft of the 2004-2008 implementation plan by June 2003; this will be a daunting task, he said, and I would recommend that the IT schedule a substantive discussion of the plan at its May meeting. It was so agreed. In response to a question from Boyce, Fodrea said that, while the action agencies are interested in receiving input from the states and tribes as to how the five-year implementation plan might be improved, he cannot guarantee that all comments received will be incorporated, or even responded to. Athearn added that the action agencies are also in the process of developing an outline of their five-year water management plan; that outline should be available next month. I'll put this on the May IT agenda, Palensky said.

9. Next IT Meeting Date.

The next Implementation Team meeting was set for April 30-May 1 in Wenatchee, Washington. Meeting summary prepared by Jeff Kuechle.